Certain intercepted packets may be delivered over a CDC using PacketEnvelope messages as shown in the following figure.

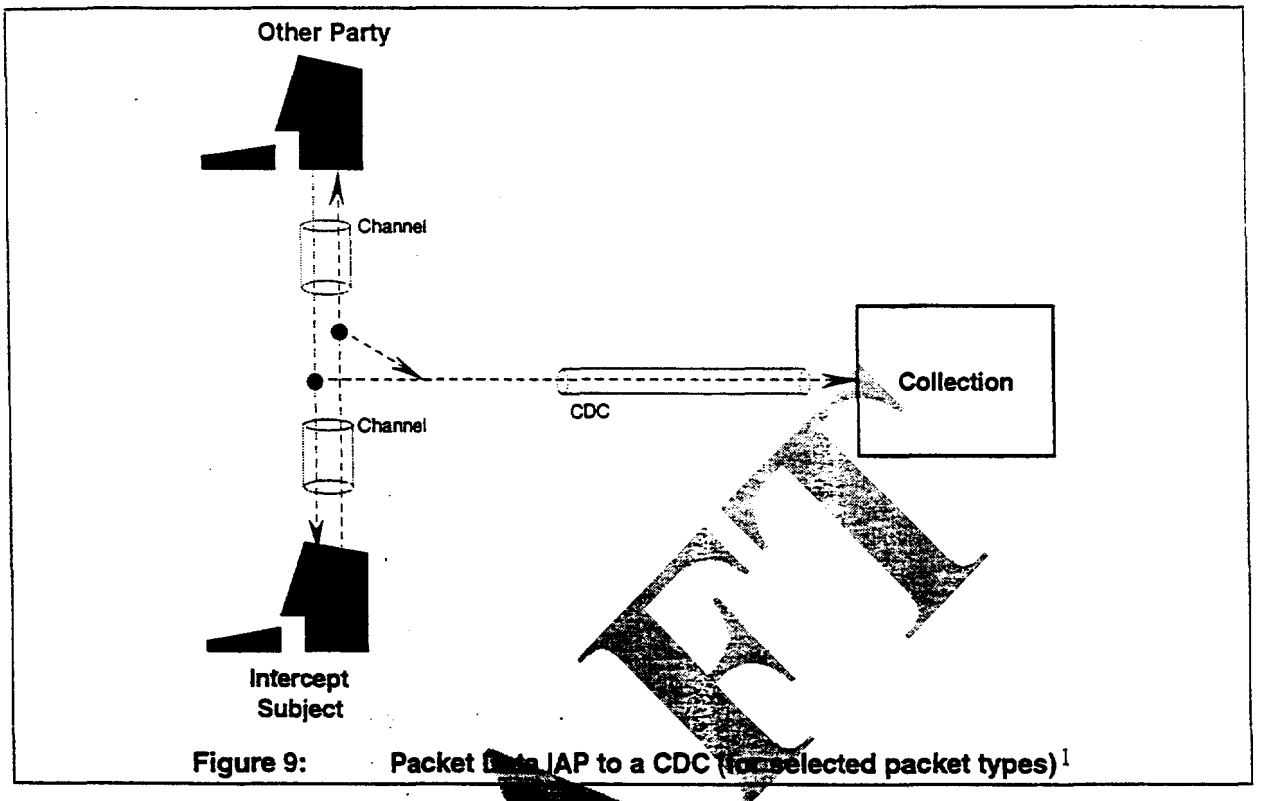

Figure 9: Packet Data IAP to a CDC (for selected packet types)[1]

4.6 Restrictions

4.6.1 Lack of CDC and CCC Synchronization

For call content and call-identifying information are delivered to an LEA using the independent services of the CCCs and CDCs respectively, and since the services can be provided on independent networks (e.g., dedicated circuits for the CCC and switched packet network delivery for the CDC); the information may not necessarily be synchronized when received by an LEA.

4.6.2 CDC Congestion

When the intercept communication resources, e.g., CDCs, are limited, the communications are accessed on a first-in, first-out, non-queued basis. If a particular CDC is congested, messages destined to that CDC may be discarded.

4.6.3 CCC Exhaustion

When the intercept communication resources, e.g., CCCs, are limited, the communications are accessed on a first-come, first-served, non-queued basis. In other words, CCCs are assigned as they are needed. If a CCC is needed and none is available, that request is ignored, even if a

The Origination message includes the following parameters:

Table 5: Origination Message Parameters

Parameter	MOC	Usage
Case Identity	M	Identifies the Intercept Subject.
Access Location	C	Included to identify the location of the Access Function when the underlying data carriage does not imply that location.
Time Stamp	M	Identifies the date and time that the event was detected.
Call Identity	M	Uniquely identifies a call within a system. A unique call identity may be generated for the Origination message which is used to correlate other messages. An exception is possible when such an attempt is considered part of an on-going call (e.g., three-way calling or conference calling for some systems).
Calling Party Identity	C	Include when more specific than the intercept subject identity associated with the case identity to identify the originating number.
Called Party Identity	C	Included when known to identify the called party. This will not be present for calls that were partially dialed or could not be completed by the access system.
Input	C	Include when specific user or translation input is known. This may be present without information when a call is attempted without input (e.g., hot line).
Location	C	Include when the location information is reasonably available at the IAP and delivery is authorized, to identify the location of an intercept subject's mobile terminal.
Transit Carrier Identity	C	Include when the transit network selection is known to identify it.
Bearer Capability	C	Include when known (or presumed) to indicate the requested bearer service for the origination.

5.4.6 PacketEnvelope

The PacketEnvelope message is used to convey data packets over the CDC as they are intercepted. (Packet-mode communications delivered over CCCs or packet-mode communications using circuit-mode facilities do not use the PacketEnvelope.)

The PacketEnvelope message may be triggered when:

- a packet-mode user communication intended for the intercept subject is detected; or
- a packet-mode user communication from the intercept subject is detected.

The PacketEnvelope message includes the following parameters:

Table 6: PacketEnvelope Message Parameters

Parameter	MOC	Usage
Case Identity	M	Identifies the Intercept Subject.
Access Location	C	Included to identify the location of the Access Function when the underlying data carriage does not imply that location.
Time Stamp	M	Identifies the date and time that the event was detected.
Call Identity	C	Include when the packet is associated with a particular call instance.
Location	C	Include when the location information is reasonably available at the IAP and delivery is authorized, to identify the location of an intercept subject's mobile terminal.
Packet Information One of: ISDN-based user-to-user signaling information IS-41-based short message service GSM-based short message service	M	 Information pertaining to ISDN user-to user signaling messages. Information pertaining to IS-41 short message service messages. Information pertaining to GSM short message service messages.

5.4.7 Redirection

The Redirection message reports the redirection of a circuit-mode call.

The Redirection message is triggered when:

- an incoming call attempt to the intercept subject is forwarded (e.g. call forwarding or call diversion);
- an incoming call attempt to the intercept subject is deflected (e.g., call waiting deluxe or call deflection); or
- an incoming call attempt to a intercept subject with terminal or personal mobility is redirected to the intercept subject's current location (e.g., call delivery).